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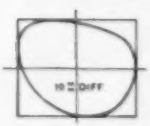

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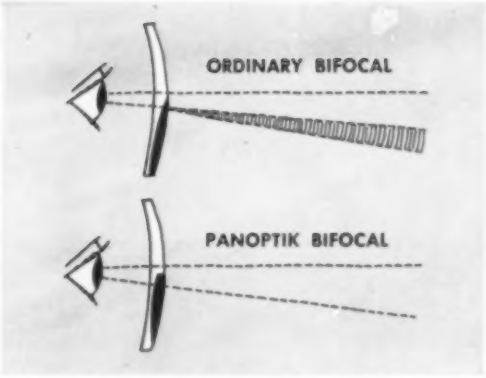

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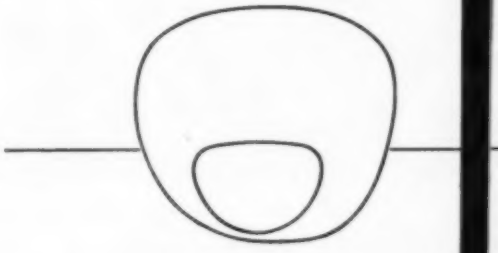

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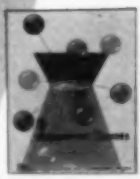

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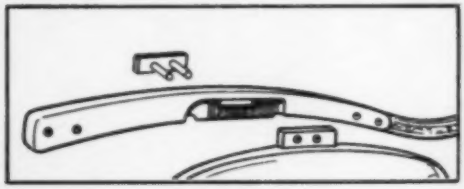

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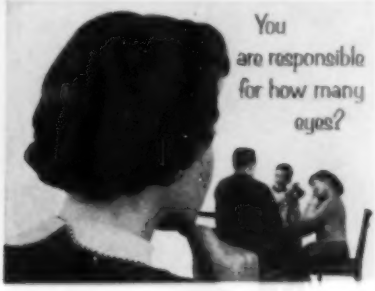

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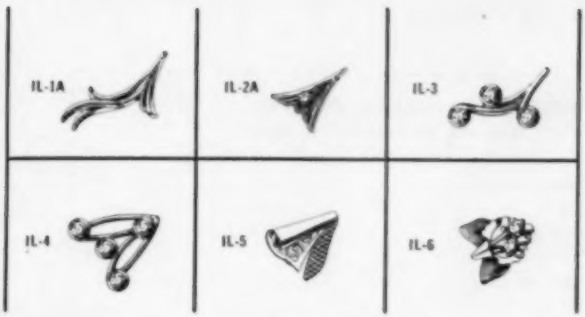

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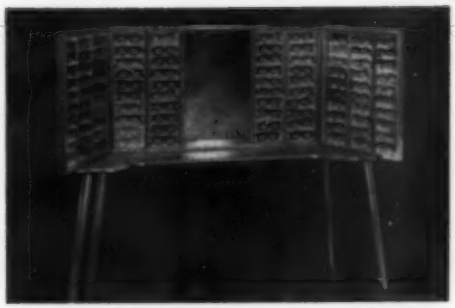

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Vol. 35 February, 1958 No. 2

SUBJECTIVE AND OBJECTIVE CRITERIA OF BINOCULAR FUSION*

Allan G. Bennett, August H. Wells, Rudolf F. Binder and G. A. Brecher

From the Department of Ophthalmology and Physiology, School of Medicine, Western Reserve University, Cleveland 6, Ohio and the Departments of Ophthalmology and Physiology, College of Medicine, and the Institute for Research in Vision, The Ohio State University, Columbus 10, Ohio.

In previous work it was shown that the time required for accomplishing binocular fusion can be measured subjectively. This was done by slowing the fusion response through the interrupted presentation of brief fusion stimuli.[1, 2, 3] It was hoped that this simple method could be suitably standardized so it would be of value for measuring the strength of binocular fusion in patients. In the present paper an attempt to accomplish such standardization is briefly described and the reason discussed why this was not successful. This is followed by a description of a new objective method for measuring velocity and extent of binocular fusion movements by recording such movements cinematographically.*

STANDARDIZATION OF SUBJECTIVE FUSION DETERMINATION

METHOD

Previous investigations of binocular fusion have suggested that fusion times not only depend upon the subject's fusional power, but also upon the amount of heterophoria. It was, therefore, intended to standardize the determination of fusion time by eliminating individual differences in heterophoria. In order to accomplish this it was attempted to make each subject orthophoric by a suitable prismatic correction. After such correction a standardized prismatic deviation was introduced in the hope that this would result in approximately the same degree heterophoria in each individual and in turn would permit a comparison of fusion times at the same heterophoria. The natural heterophoria of the subject was determined after occluding one eye for 20 seconds while the other fixated a point light source mounted in the

*Submitted on November 26, 1957, for publication in the February, 1958, issue of the AMERICAN JOURNAL OF OPTOMETRY AND ARCHIVES OF AMERICAN ACADEMY OF OPTOMETRY. Dr. Gerhard A. Brecher is now Professor and Chairman, Department of Physiology, Emory University, Emory University, Georgia. Fellow, American Academy of Optometry.

*Parts of this work have been previously reported as abstracts[3, 4] and as a thesis.[5]

center of a tangent screen at six meters distance. At the end of this time the occluded eye was exposed for 1/25 of a second and the double image localized. Then two Risley prisms, mounted at right angles on a phorometer, were adjusted by trial and error until the natural eso- or exophoria and hypo- or hyperphoria were compensated for and orthophoria would be regularly attained at the end of each fusion free period of 20 seconds. Thereafter, in addition to the Risley prisms, a one and a two diopter prism were independently inserted in front of the occluded eye. This produced an artificial phoria of one diopter in the vertical direction and a phoria of two diopters in the horizontal direction. The occluded eye was not forced to compensate for a predetermined phoria in the horizontal axis and independently in the vertical axis. The fusion time was then determined by presenting, every third of a second, a fusion stimulus of 1/25 second duration with an episcotister. The subject then recorded the time from the instant he experienced diplopia to the instant when fusion was attained.

DATA AND INTERPRETATION

A standardized exophoria of 2Δ was introduced in subjects AB and AW in four separate experiments. The subjects were readjusted to subjective orthophoria for each experiment. Five determinations of the fusion times were made during each experiment as shown in Table I. These data show a great variability in fusion times at dif-

TABLE I

FUSION TIMES SUBJECTIVELY DETERMINED ON DIFFERENT DAYS WITH THE SAME DEGREE OF EXOPHORIA

Exp.	Fusion time in seconds					Average
			Subject AW			
1	1.13	1.35	2.06	0.90	1.81	1.45
2	9.18	12.70	6.19	13.52	11.27	12.55
3	0.64	1.00	1.12	1.18	1.17	1.22
4	3.74	1.65	1.66	1.73	4.61	2.68
			Subject AB			
1	1.73	1.38	0.97	0.80	1.21	1.22
2	1.43	1.61	1.58	1.08	1.56	1.22
3	0.84	0.78	0.87	0.77	0.55	0.76
4	1.08	1.26	1.33	1.25	1.15	1.21

ferent experiments under otherwise identical conditions, i.e., the same time of the day and apparently the same state of mental alertness. Additional experiments on numerous other subjects revealed a similar scatter of measurements. It was concluded that the conditions for testing fusion times could not be adequately standardized to furnish reproducible results.

During the attempts to correct natural heterophorias with the Risley prisms it was noticed that subjective orthophoria could be

obtained in each subject by using various degrees of prismatic corrections. Obviously the reason for this occurrence is that within a certain range of prismatic corrections the image of the light spot was projected on corresponding Panum areas and appeared subjectively fused. The variability of the subjectively orthophoric position has been emphasized by the studies of Ogle and his collaborators.[6, 7] It was furthermore noticed that the natural heterophoria usually fluctuated from minute to minute by approximately one prism diopter. Such fluctuations of heterophorias are well known and have been analyzed in detail by Schubert.[8] It appears then that the establishment of subjective orthophoria by suitable prismatic corrections is not a usuable criterion for obtaining consistently the same relative position of the two eyes. In other words the tonic equilibrium of the external eye muscles is not the same in all instances when subjective orthophoria is attained. This may serve as an explanation that the creation of a fixed degree of heterophoria (e.g. 2Δ) superimposed upon the variable tonus equilibrium at subjective orthophoria would result in variable fusion times.

It may therefore be concluded that the establishment of subjective orthophoria does not furnish a reliable basis for the development of a standardized and easily applied method for the measurement of binocular fusion times and thereby fusional power. However, this information does not conflict with the previous observations that the measurement of fusion times from the natural heterophoric position of a subject provide a measure of the individual's fusional power under the test conditions.[1, 2]

KINEMATOGRAPHIC MEASUREMENT OF FUSION TIMES

METHOD

After the above observations were made it was believed that the development of an objective method for measuring fusion times would furnish more reliable information for a comparison of fusional behavior in different individuals. Since the intent was to preserve natural viewing and environmental conditions it was attempted to record kinematographically the eye positions during fusional movements similarly as this had been done in 1907 by C. H. Judd.[9] Fusion movements were recorded at 24 frames per second with a 16 mm. motion picture camera using telephoto lens for magnification of the eyes. At first it was thought that the high brightness level required for normal film and the necessary magnification might interfere with the observation of a fixation target by the subject. Therefore, infrared lighting and infrared sensitive film were tested in preliminary experiments at 64 frames per second. However, owing to the difference in focal length of infrared

and visible light, it was not possible to focus the camera in a consistently reproducible manner for obtaining distinct pictures. The best compromise was then achieved with visible light at high but not uncomfortable brightness levels using a sensitive film (Kodak Tri-X negative).

A total of 42 normal subjects were tested in the following manner. The person's head was stabilized with a head and chin holder. Two fixation targets (point light sources) were arranged in the line of vision at 0.6 and 4 m. distance respectively. The camera was placed beneath the visual line at a distance of 1.20 m. Two photoflood lamps were suitably arranged to illuminate the eyes without producing discomfort. The subject was asked to fixate on the particular target light being used. One eye was then occluded for 15 seconds. The camera was run up to normal speed during the last three seconds of the occlusion period. The occluder was then quickly removed and the camera allowed to run for about three more seconds. Eight tests were made on each subject, two for each eye at each of the two fixation distances.

Each frame of the film was measured separately with a time study projector at a constant projection distance which magnified the eyes 2.5 times their normal size. A stationary reference point was chosen for each eye, usually a high-light reflected off the inner canthus. The distance between the reference point and the inner aspect of the limbus was measured to the nearest quarter millimeter in all frames. After the first frame the distances in the succeeding frames were either greater than or equal to that measured in the first frame. A distance decrease was plotted as nasal eye movement and an increase as a temporal movement.

DATA AND INTERPRETATION

Figure 1 shows a representative example of an eye movement of a normally exophoric subject illustrating the latent period fusional movement and the eye position attained after accomplishment of fusion. Figure 2 shows a corresponding example from an esophoric person. In each case the right eye had been occluded. It is noticed that according to these measurements the eye shows continuous small position changes upon which the more extensive fusional movements are distinctly superimposed. Without suitable comparative methods it cannot be established to which extent the small position changes are real (e.g., fixation tremor) or distorted by the random error inherent in the limitations of the method's accuracy (0.1 mm.).

The data in Table 2 reveal that out of a total of 336 tests the majority showed no definite fusion movement of the eyes which was detectable when the film was examined closely at 24 frames per second.

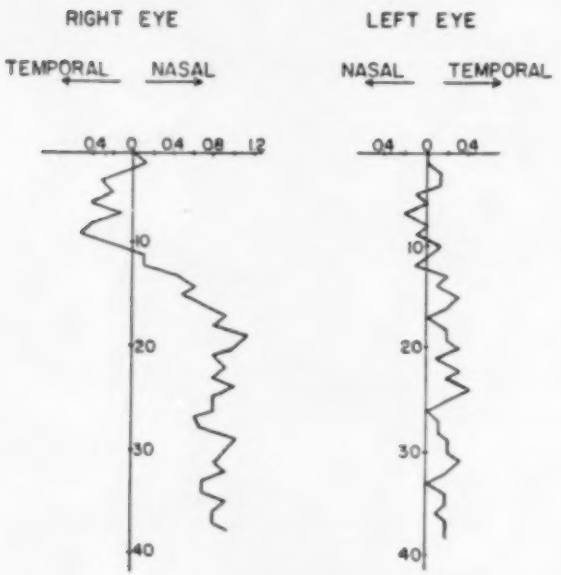

Fig. 1. Fusion movement of an exophoric subject viewing a target at 4 m. distance. Ordinates: position change of the limbus in mm. Abcissa: frames, 24 per second. A 1° rotation of the eyeball in the horizontal plane corresponds approximately to a 0.2 mm. lateral movement of the limbus.

This lack of detectable fusion movements in the majority of the subjects differs from the common observation that the majority of normal subjects show definite fusional movements by subjective examination methods.[1]

Several factors may account for the great number of cases in which fusion movements were not visible or in which the kinematographic pictures were not usable. (a) A certain number of subjects were probably orthophoric, although this number may be relatively small concluding from numerous observations made with various subjective

TABLE II
DISTRIBUTION OF KINEMATOGRAPHIC TESTS USABLE FOR ANALYSIS

Total number of subjects photographed	42
Total number of tests	336
Number of subjects with a measurable movement	22
Percentage of subjects with a measurable movement	52%
Number of tests with a measurable movement	36
Percentage of tests with a measurable movement	11%

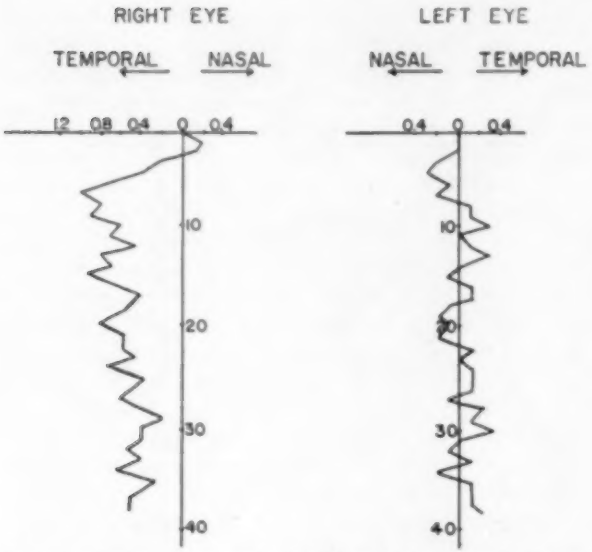

Fig. 2. Fusion movement of an esophoric subject viewing a target at 4 m. distance. Description as in Figure 1.

methods.[1, 9] (b) Some subjects had apparently minute fusion movements which were too small for detection by filming but might have been revealed subjectively. (c) It may be possible that upon removal of the occluder subjective diplopia occurred which was followed by *sensory* fusion of the images, but which was not accompanied by motor fusion, i.e., so-called fusional eye movements. The possibility that sensory fusion alone may exist without the motor component had been pointed out previously.[1 (page 139)] This interesting observation may deserve future study by simultaneously employing suitable subjective and objective methods. (d) Some subjects showed irrelevant voluntary eye movements. (e) Blinking sometimes disturbed the analysis of fusion movements. (f) Some subjects were disturbed by the removal of the occluder.

In 54 tests definite fusion movements were noticeable which warranted graphic analysis. Of these the time course and extent of the movement could be accurately determined in 36 tests (Table 3). Three of the subjects (Numbers 3, 16 and 18) were esophoric at 4 m. and exophoric at 0.6 m. target distance whereas two subjects (Numbers 11 and 21) were exophoric at these distances. At 0.6 m. target distance

TABLE III

INDIVIDUAL DATA OF FUSION MEASUREMENTS

	Subject	Exophoric	Esophoric	Eye occluded	Target distance in m.	Latent period* in seconds	Duration of movement of occluded eye in seconds	Distance moved by occluded eye in mm.**
1.	PL	X		L	0.6 m	0.21	0.62	0.8
	PL	X		R	0.6 m	0.42	0.42	0.8
2.	PT	X		L	0.6 m	0.33	0.42	1.1
	PT	X		R	0.6 m	0.17	0.67	0.9
3.	JC		X	R	4.0 m	0.12	0.29	1.1
4.	RA	X		R	0.6 m	0.46	0.37	0.9
5.	JW	X		L	0.6 m	0.21	0.75	0.8
	JW	X		R	0.6 m	0.21	0.54	0.6
6.	HN	X		R	0.6 m	0.17	0.29	0.9
7.	JS	X		L	0.6 m	0.21	0.62	1.0
8.	DJ	X		R	0.6 m	0.12	0.54	1.1
9.	CK	X		R	0.6 m	0.25	0.83	0.9
10.	RF	X		R	0.6 m	0.12	0.50	0.9
11.	BB	X		R	0.6 m	0.42	0.42	0.4
	BB	X		R	4.0 m	0.29	0.54	0.7
12.	RS	X		L	0.6 m	0.50	0.75	0.8
13.	DW	X		L	0.6 m	0.25	1.00	0.9
	DW	X		R	0.6 m	0.21	0.50	0.5
14.	DB	X		R	0.6 m	0.29	0.87	0.7
15.	LE	X		L	0.6 m	0.50	0.33	0.9
16.	BT		X	R	4.0 m	0.04	0.58	0.4
17.	CW	X		L	0.6 m	0.29	0.96	0.9
18.	JA		X	L	4.0 m	0.04	1.21	0.5
19.	SS	X		L	0.6 m	0.33	0.58	0.7
	SS	X		R	0.6 m	0.25	0.58	0.9
	SS	X		R	4.0 m	0.33	0.29	0.5
20.	MB	X		L	0.6 m	0.50	0.33	0.6
	MB	X		L	0.6 m	0.62	0.62	0.5
	MB	X		R	0.6 m	0.42	0.58	0.7
	MB	X		R	0.6 m	0.42	0.42	0.7
21.	RD	X		R	0.6 m	0.33	0.71	1.0
	RD	X		R	0.6 m	0.42	0.62	0.9
	RD	X		R	4.0 m	0.25	0.37	0.5
	RD	X		R	4.0 m	0.33	0.33	0.6
22.	ID	X		L	0.6 m	0.62	0.37	0.5
	ID	X		R	0.6 m	0.42	0.58	0.8

*Latent period is the time from the removal of the eye occluder until the beginning of the fusional movement.

**A 1° rotation of the eyeball in the horizontal plane corresponds approximately to a 0.2 mm. lateral movement of the limbus.

all subjects were exophoric. These observations are in good agreement with the well known fact that the degree and direction of lateral phorias are related to the target distance upon which the subject converges or diverges after the occlusion is removed.[9, 10] The results of the 36 tests are summarized and averaged in Table 4. From these data it may be

TABLE IV
SUMMARY OF RESULTS

	33 tests (91%) on 18 EXOPHORIC subjects	3 tests (9%) on 3 ESOPHORIC subjects
Latent period of fusion reflex:		
Minimum	0.12 sec.	0.04 sec.
Maximum	1.04 sec.	0.12 sec.
Average	0.35 sec.	0.07 sec.
Duration of fusion movement:		
Minimum	0.29 sec.	0.29 sec.
Maximum	1.00 sec.	1.21 sec.
Average	0.60 sec.	0.70 sec.
Actual eye movement:		
Minimum	0.4 mm.	0.4 mm.
Maximum	1.1 mm.	1.1 mm.
Average	0.8 mm.	0.7 mm.

concluded that there is apparently no principal difference between the exo- and esophoric fusion as far as duration and extent of movement are concerned. However, the latent period of fusion from the exophoric position appears to be shorter than that from the esophoric position. It cannot be decided whether the difference in latent periods is a consistent occurrence because the number of tests was too small.

The analysis of the data revealed that the fusion time may not necessarily be correlated with the degree of phoria, e.g., subjects 3 and 6 (Table 3) were "fast fusers" correcting large degrees of phoria whereas subjects 14 and 18 were "slow fusers" though their phorias were small. The same observation was made when fusion times were determined subjectively.[1] This point is of particular interest, because the same phenomenon was observed with two completely different experimental approaches. It indicates that both methods, the objective and subjective, are comparable in measuring fusion time. The fusion times determined with the objective method are, of course, much shorter than those measured with the previously employed subjective method. With the latter, the fusion time is purposely drawn out by presenting the fusion stimuli with brief interruptions. Otherwise, it would be too short for it to be perceived and used for precise measurement. The good agreement of the objective and subjective methods for the determina-

tion of fusion times in naturally heterophoric persons is valuable for future studies. It adds reliance to the results obtainable with the simple subjective method.

A critical comparison of the kinematographic method with the other objective recording methods of fusional movements is not possible yet. For such purpose it would be necessary to record simultaneously the movements with two methods. The most promising recording technique is at present the ophthalmographic method as modified by Westheimer.[11] This method has the advantage that it permits a continuous record of ocular movements. One can easily measure the slope of the curves and calculate maximal velocities and acceleration of fusional movements. The kinematographic method in its present simple form does not seem to offer the same precision on account of the limited number of frames and magnification. This is readily noticeable by comparing the curves plotted in Figures 1 and 2 with the continuous curves taken with Westheimer's method.

A further criticism of the kinematographic method for measurement of eye movements was recently made by Ogle and his collaborators.[12] They demonstrated the inaccuracy in photographing and other methods of objectively recording ocular movements and related it to the fact that the eyes do not turn about fixed axes. Nevertheless it is believed that the measurements reported in the present study represent at least directionally and qualitatively the degree and time course of fusional movements because these movements were rather extensive in comparison to the inaccuracies introduced by the method.

SUMMARY

Two different methods for a simple determination of binocular fusion time were tested. A previously described subjective method using interrupted fusion stimuli was modified for determining fusion power with standardized degrees of heterophoria. No reliable standardization could be achieved because the extent of Panum's areas prevented a reproducible establishment of subjective orthophoria with prisms. It is concluded that subjective orthophoria may occur within a small range of different vergences.

Extent and time course of natural fusional movements were kinematographically recorded with a standard camera. The average fusion time, including latent period and duration of movement, was about one second. There was no apparent correlation between the velocity of the fusional movements and the degree of heterophoria. Some subjects with large phorias were fast fusers whereas other with small phorias were slow fusers. These objective findings were in good agreement with

similar observations previously reported with the subjective method of presenting interrupted fusion stimuli.

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ANNOUNCEMENT

FORUM ON VISION AND READING AT LOS ANGELES

A Forum on Vision and Reading is to be held at the Statler Hotel, Los Angeles, February 15. The sponsors are the Committee on Visual Problems in Schools of the A.O.A. and the Los Angeles County Optometric Association. A large number of optometrists and educators are expected to attend.

SOME INTERESTING EYE MOVEMENTS OBTAINED DURING THE COVER TEST*

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This film demonstrates an interesting kind of eye movement that may occur during the objective cover test. Specifically, as the preferred eye is covered in the unilateral cover test, there is a small movement (1Δ to 6Δ) of the other eye as it takes up fixation. But, with the alternate cover test a greater movement is observed. Since the alternate cover test is ordinarily understood to disclose the "fusion-free" angle of deviation, the question arises as to the interpretation of this small "flick" observed during the unilateral cover test.

Shown in the film are three of the twenty-five patients with this "flick" who have been studied during the past several years at the University of California School of Optometry. These persons as a rule seem to have the following characteristics: (1) comfortable binocular vision, (2) large heterophoria, (3) small angle of anomaly, and (4) fair to good stereo-acuity. The "flick" seems to be more common in eso- than in exo-deviations. Frequently, it develops following orthoptic treatment of a strabismus. And, adaptation to correcting prisms usually occurs, that is, the "flick" is not changed by the prisms.

The objective cover test as performed in the film is divided into the unilateral cover test, the alternate cover test, and a supplementary procedure.

Unilateral cover test. One eye is quickly covered and the other eye is observed for movement. The three subjects in the film all show less than 6Δ of movement ("flick") in this test when the preferred eye is covered: there is no movement of the preferred eye when the other eye is covered. By itself, this result suggests the presence of a unilateral strabismus of less than 6Δ.

Alternate cover test. The occluder is moved from one eye to the other: the movement of the eye that is just exposed is neutralized by placement of an appropriate prism in front of this eye. All of the

*In part the text from a 16-mm. Kodachrome film with Magnastripe sound. Shown at the annual meeting of the American Academy of Optometry, Houston, Texas, December 8, 1956. Photography by Dr. Jack T. Hobson and narration by Dr. Henry B. Peters, members of faculty, University of California School of Optometry, and Fellows, American Academy of Optometry.

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subjects in the film show movement with this test that is significantly greater than the "flick" revealed in the unilateral cover test.

Supplementary procedure. The unilateral cover test is repeated with a prism before the non-preferred eye. The prism power is selected to equal the amount of the "flick" originally observed in the unilateral cover test. When this is done in strabismus, the movement of the deviating eye is eliminated. For the three subjects in the film, the "flick" remains when the unilateral cover test is repeated with the added prism. Hence, the "flick" is not an unequivocal demonstration of a strabismus. This conclusion is further supported by the results obtained when a loose 4Δ-prism is quickly placed base-out before the preferred eye. In strabismus the deviating eye moves temporalward by the amount of the added prism and remains stationary. For the subjects in the film, adding the base-out prism results in the non-preferred eye either not moving at all, or momentarily moving temporalward (conjugately) and then returning to its original position (disjunctively).

A brief description of each subject shown in the film follows.

Miss R.Z. Age 9 years. This patient had orthoptics and periodic occlusion to eliminate an intermittent esotropia (present about 50% of the time) and a large (20°) suppression area of the right eye. There was no amblyopia and the ametropia was less than one diopter.

Following the reduction of the suppression, base-out prisms of 6Δ total were prescribed. Then, constant binocular vision with an esophoria of 20Δ to 25Δ was obtained. There was now good stereoacuity, and an apparent angle of anomaly of about 3Δ. A small, vague 2° central area of suppression of the right eye remained. There were no symptoms present.

It was then noticed that on covering the left eye, the right eye made a temporalward movement of about 5Δ. Removal of the prism prescription or addition of more base-out prism failed to eliminate the small "flick" of the right eye.

Master K.H. Age 8 years. This patient received orthoptics and constant, total occlusion for a constant, alternating exotropia of 25Δ and a dense suppression area of 5°. The correspondence was normal; the ametropia was negligible; there was no amblyopia.

Following establishment of constant diplopia, training lenses consisting of a —1.00 D. addition and a total of 6Δ base-in were prescribed. Constant binocular vision with an exophoria of 25Δ was then obtained. At this time a nasalward "flick" of 2Δ of the left

eye was noted upon covering the right eye in the unilateral cover test. The "flick" was present without the training lenses, or with larger amounts of base-in prism.

Miss P.B. Age 13 years. This patient received orthoptics and periodic occlusion for an intermittent, alternating esotropia of 25Δ with moderate alternating suppression and probable intermittent unharmonious anomalous correspondence. Hypermetropia of 1.50 D. for each eye had been previously corrected with lenses. A slight amblyopia of the right eye was present.

Following orthoptics there was a constant esophoria of 14Δ with no amblyopia, no suppression, good stereo-acuity, and an apparent angle of anomaly of about 5Δ. There were no symptoms. With or without the correction lenses the same temporalward "flick" of 4Δ of the right eye was observed when the left eye was covered in the unilateral cover test. With base-out prisms, the "flick" could be reduced but not eliminated.

At the time of filming (September, 1956) the interpretation of this "flick" is not clear. It can be explained in at least two ways:

1. An unusually large fixation disparity associated with a large heterophoria and otherwise normal binocular vision.

2. A constant strabismus wherein the "fusion-free" deviation has been reduced, but not completely eliminated, by motor fusional movements that are related to an unharmonious anomalous correspondence with a small angle of anomaly.

An intriguing speculation is that these two explanations are physiologically equivalent. If true, this "flick" might be a manifestation of a "connecting link" between normal and anomalous correspondence.

ANNOUNCEMENT

POST-GRADUATE COURSES AT UNIVERSITY OF HOUSTON

The College of Optometry, University of Houston, will offer a number of post-graduate courses dealing with refraction and contact lens fitting on March 29 and 30 on the campus at Houston. Faculty members will conduct the courses. Interested optometrists should write the College of Optometry, University of Houston, Houston 4, Texas, for course descriptions, costs and application blanks.

PSYCHOSIS AND NEUROSIS ENCOUNTERED IN CONTACT LENS FITTING WITH CASE REPORTS*

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The writer is aware of the difference in refractive technique in prescribing for conventional spectacles and modern contact lenses. This discussion will make reference to the psychological aspects, as one of the main variations to be considered.

Those optometrists who have been engaged in the contact lens field over an extended period of time, will agree that much of the patient's wearing time depends on fear, emotions, enthusiasm and the patient's psychologic attitude. Some of these factors may be classified under psychologic, neurologic or psychosometic variations. Basically they all resolve into either success or failure on the basis of the patient's mental reaction towards contact lenses.

The title of this report refers to psychosis and neurosis. Examples of individuals, who with their contact lenses (1) were able to dispose of their psychosis or neurosis, (2) who were unsuccessful in wearing their lenses because of these psychologic factors, and (3) those who claimed to have had no neurotic or psychologic interference and became problems fully or temporarily, because of their attempt at using contact lenses.

For the purpose of this report psychosis is defined as an involvement of the mental phenomena as related to interpretation by the conscious and, or, the subconscious. Neurosis is a disturbance of the nervous system, local or general, with either temporary or permanent effects upon any of the organs of the body.

From these definitions it appears that neither condition can be regarded as a physical defect or even pathology in its true sense, but rather a mental situation inflicted by the person upon himself, either positively or negatively. It is also understood that neurosis might be the result of psychosis, or is so closely interlocked with it, that for our discussion, we may in most instances refer to both situations as interlocked, one with the other.

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*Read before the annual meeting of the American Academy of Optometry, Chicago, Illinois, December 8, 1957. For publication in the February, 1958, issue of the AMERICAN JOURNAL OF OPTOMETRY AND ARCHIVES OF AMERICAN ACADEMY OF OPTOMETRY.

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The use of contact lenses frequently inhibits greater confidence and therefore can be regarded as a therapeutic measure for patients who suffer with psychosis or neurosis, as a result of various forms of inferiority complexes developed, because of refractive errors that prevent persons doing the normal things they want to do. It is also true that correction of refractive errors by means of spectacles have eliminated many of psychopathic problems. However, contact lenses carry our services even beyond spectacles to the patients who either cannot be helped sufficiently with spectacles or to those whose psychologic ego is not satisfied with them. These latter types of patients create a neurosis within themselves because they find spectacles objectionable psychologically.

When patients or colleagues discuss the value of contact lenses for patients who do not like spectacles, the writer looks upon the investigation from the psychologic aspects and the remedy as one which relieves a mental problem of the patient. The writer does not look upon this as a cosmetic complaint, and disapproves considering it as such. As we know, it is not uncommon to face the questioning regarding vanity, or objection to spectacles because the patient feels that her appearance is better without them. At times patients even express a strong dislike of spectacles, because they change the patient's facial appearance. Some are actually unhappy and bitter because they cannot wear the kind of hats they like. These patients fall into the category of having a psychosis, and the use of contact lenses for them is a therapeutic measure or prophylactic application to relieve this mental condition. To illustrate this and other types of psychosis and neurosis, ten case histories are presented.

B. Z. Male. Age 18. Refractive error: O.U. —13.00 D. sph. This patient developed an inferiority complex, because he was self conscious of the peripheral thickness of his lenses and the reduced size of his pupils. His lenses were already in a thin-lite form. His mental attitude is a form or psychosis, because in his own imaginative world, he created a situation of self-imposed punishment. He refused to go to parties or go out with girls, and even with boys his relationship was limited. All this took place because he "imagined" that everyone would ridicule him or shun him. So he shunned himself. After he had his contact lenses, his self confidence was restored and he was reassured. He then faced the very people he previously avoided and henceforth carried out a perfectly normal and happy life. Here, one can regard the prescribing of contact lenses as a cure for his psychosomatic or psychiatric self created situation.

H. R. Female. Age 62. In 1956 this patient was using O.D.

—5.00 D. sph. O.S. —8.00 D. sph. In 1941 her refractive error was corrected with spectacles. O.D. —2.50 D. sph. ⊂ —1.00 D. cyl. axis 165, giving her 20/30 vision; O.S. —4.00 D. sph. (history of ulcerated cornea) 20/200. I prescribed fluid contact lenses because she shunned people. Being a widow, she also felt that she was more alone and her opportunities of meeting friends were greatly reduced with spectacles. With contact lenses her vision was improved to: O.D. 20/20; O.S. 20/30. This patient was highly nervous. She feared the contact lenses, and required many visits to teach her inserting and removing. Her strong determination to improve her appearance eventually overcame the tension and with self confidence restored, she was able to wear the lenses periodically, with fair degree of success. My contact with the patient then terminated and 15 years later was resumed when she requested me to prescribe microlenses. She was ever so much more nervous and the likelihood of a successful fit seemed problematical, judging from her initial response. My satisfaction came in her eventual wearing of the microlenses for full day periods about six months after I prescribed them. At the outset she was quite a problem. I saw her three times weekly for two-hour visits for two months before she overcame her fear of the new insertion. This period was thus consumed just for this instruction, and practice. She was unquestionably neurotic, but this disappeared by the time she discovered how well she could see and how comfortable she can be with the new lenses. Here psychology, patience and indulgence had to be employed. This person's mental attitude has completely changed for the better, because of her encouraged and enthused reaction to her microlenses. This patient overcame a handicap.

E. F. Female. Age 15. This patient was wearing O.D. —5.00 D. sph. O.S. —5.75 D. sph. She was anxious to have contact lenses, as she felt that she would be happier with them and would enjoy her forthcoming school and social season with greater confidence. Yet, she feared contact lenses. During the first visit she fainted and was fully unconscious for several minutes. This was the result of her overenthusiasm coupled with fear, wanting the contact lenses, yet being afraid of them. After she resumed her composure and acknowledged no discomfort from the lens which was still in her eye, she was somewhat relieved. The initial insertion experience being over, the nervous tension remaining high, I felt that this was enough for the first visit. One would probably be tempted to stop at this point and tell the patient that she should just forget contact lenses. I analyzed the situa-

tion differently. I felt that her problem would be overcome if I could instill self confidence. I told the patient that we would continue. She was relieved and I told her that rather than to follow the usual routine, on the next visit I would teach her to insert trial lenses. Yet, even though she then knew that the lenses would not hurt, and that she could insert them herself after instruction, she was very tense during the second visit. After she put in one lens she looked at me with a glassy look and said: "Oh, no—" and for a few seconds she felt dizzy, but then composed herself. The patient's mother told me that she feared so much that I would refuse to fit her with contact lenses that the nervous tension was high. At this point, as a matter of psychology, I reassured the patient that we will overcome every obstacle and that I would do all I could to be sure that she be enabled to have contact lenses. I felt that any patient with a strong desire for them eventually would overcome fitting problems. From this point on we encountered no serious difficulties. Her neurotic temperament was readjusted in time and she now wears her lenses 10 to 14 hours daily.

L. A. C. and K. O. Females. Both age 20. These patients represent a group who become panicky when anyone touches their eyes. These are cases of psychosis in general. They fear everything. The discovery of the condition is generally made during the first visit when they push our hands away or turn their heads as we are about to insert a trial lens over the eye. To overcome their own unwarrented fear, I first teach these patients how to insert and remove trial case lenses. After they acquired the technique adequately, the fitting procedure is carried on, by having the patient insert and remove the various lenses herself. Usually this type of psychosis is overcome rapidly.

S. M. Female. Age 31. This patient was wearing O.D. —4.50 D. sph. ⌒ —0.50 D. cyl. axis 180. O.S. —3.50 D. sph. ⌒ —0.75 D. cyl. axis 180. The patient had a nervous breakdown. She was under the care of a psychiatrist and also a neurologist. The patient's father discouraged her, as he was certain that she could not wear contact lenses. She had to meet a challenge. She was determined to prove to her father and to herself that her will of wanting contact lenses will supersede all previous handicaps. At first she did very nicely. She was fully cooperative in every aspect. Her wearing time was gradually increased to an average of seven to eight hours per day. This pleased her father and needless to say, restored confidence in the patient's own mind. This was reflected in her new happy behavior. Unfortunately, however, a set-back in her present life removed all that had been gained. Her employer, a very well liked person, passed away. The entire office

felt this tragedy. The patient, having been a neurotic individual at the outset, was greatly effected emotionally. This, coupled with a new administration in the office, new work standards, new ways of doing things, disturbed her to a great extent. So much so that for months she did not engage in any social life, nor did she use her contact lenses. She had a neurologic set-back. As far as I know, she had abondoned the use of contact lenses because she lost interest in everything and nothing seemed to stimulate her enthusiasm or interest. As a summary for this type of patients we can classify this history as one in which contact lenses would have eliminated her entire neurotic state, if not for the newly developed extenuating circumstances.

A. M. Female. Age 44. This patient was wearing O.D. —7.50 D. sph. ⊃ —4.50 D. cyl. axis 160 (20/60). O.S. —8.00 D. sph. —4.50 D. cyl. axis 180 (20/200). This patient, a very nervous person, asked me questions about contact lenses following a diagnostic examination. I answered her questions and her husband, who accompanied her, stated that she will never be able to use contact lenses. The patient admitted that she is restrained from going to many public places because she feels "self-conscious" with her thick spectacle lenses. Two years later the patient asked me to prescribe contact lenses. I used a microlens with satisfying results. The patient proved to her husband that with determination she could overcome the previous neurotic state. Her joy of having conquered this element led to a complete physical relaxation as well.

B. D. Female. Age 45. This patient was wearing O.D. —8.25 D. sph. ⊃ —1.00 D. cyl. axis 180. O.S. —6.50 D. sph. ⊃ —2.00 D. cyl. axis 165. This patient represents a cross section of contact lens patients who "want to keep up with the Joneses." She felt that some of her friends wore contact lenses, therefore she, too, should have them. She appeared to be a calm person, but the lenses made her nervous. They were not as comfortable as spectacles. She tensed-up with the lenses, bringing about pressure upon the corneae. This only increased the sensitivity and feeling. She therefore reconciled herself to continue to wear her spectacles in preference to contact lenses. Here we have a situation where a calm person developed psychosometic symptoms from the contact lenses.

D. J. Female. Age 38. The patient was wearing O.D. —1.75 D. sph. O.S. —2.50 D. sph. This was a neurotic patient from many points of view. The optometrist who referred her to me had given her orthoptic treatments prior to her visit to me. She was very enthu-

siastic about contact lenses, and despite of the history of neurologic background, offered no resistance but full cooperation. This was due to her desire to eliminate spectacles. Apparently, the psychologic factors in this connection were greater than the neurologic symptoms previously presented. All would have been well, however, but problems developed several months after she had used her contact lenses successfully, when the novelty had worn off. In this patient's unstable mind, new problems developed, wherein she reported visual inefficiencies. A high esophoria was found with the contact lenses in place, which was not present when I first saw the patient. I sent her back to her optometrist for additional orthoptic training. This time she was to wear her contact lenses during the treatments. She responded fairly well, and with her binocular balance being partially restored, she was again able to wear the contact lenses. Her neurotic state not being constant, created new problems later, basically in the form of fluctuating vision. We discharged this patient as one who, because of her psychosometic nature, would have constant problems. Since the time that she was told that all that could be done was done, she again used her contact lenses with a fair degree of success. Variations still exist depending upon her nervous attitude of the day. This is unquestionably an example of neurosis, where contact lenses may help the patient's mental attitude.

This type of problem case includes neurotic persons who were mentally handicapped by the use of spectacles. These are persons who became retarded, unhappy, socially unhappy, mentally ill, either because their responsibilities were inadequately performed without their corrective lenses due to poor visual acuity, or developed psychosometic problems of their own creation because of self consciousness with corrective spectacles. In this group we find many contact lens wearers who developed some form of psychosis or neurosis prior to their use of contact lenses. Most of these people are changed persons, mentally and physically, as a result of having satisfied a certain drawback in their lives as a matter of security. Here we have persons who now with their contact lenses carry on greater responsibilities with more efficiency because their mental health has been restored. Many of these persons were actually sick in a special sort of way. Today they are well, happy and useful.

SUMMARY

In discussing the effect and result of psychosis and neurosis of persons visually handicapped, several examples were used. By citing actual experiences, we may better understand their problems and their solutions.

We must also remember that most contact lens patients offer a barrier or resistence to the idea at the outset. They invariably have to overcome a subconscious fear that was instilled in them since early childhood. We were all conditioned regarding to the sensitivity of the eyes. Patients have a vivid recollection of having had a foreign body in their eyes and how it hurt them. Therefore, most patients have to overcome this previous training and reconstruct their mental attitude and psychologic behavior to contact lenses.

CONCLUSION

It should be remembered that when a patient consults optometrists about contact lenses for what is so frequently called "cosmetic" reasons, this is basically a psychologic factor. Whether they realize it or not, these patients are mentally disturbed over the fact that they have to wear spectacles. This subconscious ego is then evidenced by a resentment to spectacles, which mental problem is cured by prescribing and fitting of contact lenses. We can conclude that contact lenses may adequately eliminate many problems of psychosometic origin.

33 WEST 42ND STREET
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ANNOUNCEMENT

P.S.C.O. ON TV EACH WEEK

For the second time the Pennsylvania State College of Optometry, Philadelphia, has been selected to present a course on WFIL-TV's public service educational program, known as the University of the Air. This program is presented "live" daily, Monday through Friday from 9:00 A.M. to 9:45 A.M. The programs are provided by two local institutions of higher education, the first from 9:00 to 9:20 A.M. and the second from 9:20 to 9:45 A.M. During the present semester, PSCO has been given the second and longer period, one day each week. This second program is also taken in kinescope and is then rebroadcast on three other TV stations in Binghamton, New York; New Haven, Connecticut and Lebanon, Pennsylvania. Dr. John C. Neill, member of the faculty and one of the country's leading contact lens specialists, will continue to present these TV optometric educational programs for the college.

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A SCHOOL VISUAL SCREENING PROGRAM IN COLORADO*

The following is a review of a program developed to improve visual screening standards. In the Fall of 1956 the School Board of R-1 District, Public Schools, Colorado, consisting of a district reorganized from 47 smaller districts, authorized $4,175 for the purpose of doing better visual screening for the students. The original plan was that ortho-raters would be used, as one had been donated to the school system, and it was thought that, with two more, a complete screening could be achieved particularly if the screening program was under the supervision of an optometrist who had not yet established a practice and was willing to work on this project as a sort of an

*Jefferson County School District R-1, Colorado. Read before the annual meeting of the American Academy of Optometry, Chicago, Illinois, December 10, 1957. For publication in the February, 1958, issue of the AMERICAN JOURNAL OF OPTOMETRY AND ARCHIVES OF AMERICAN ACADEMY OF OPTOMETRY. Report presented to Otto J. Bebber, O.D., Fellow, American Academy of Optometry.

internship. In addition to screening he could do fundus studies on those students where this seemed necessary. It was felt that he also could instruct the actual working teams of parents: aid in the compilation of statistical data, and assist the nurses and school authorities in other ways.

The first meeting of a professional group was set for October 22, 1956, and in attendance at this meeting there were to be three optometrists, an ophthalmologist, a representative from the Clear Creek Medical Society, the head of the Tri-County Health Department, and the head nurse from that department, since the program was to be administered to a large extent by the nurses of that department. The Jefferson County health chairman was also to attend. In actual attendance there were two or three others.

There was immediate opposition to the program, principally by lay members, on the basis of it being an unnecessary expenditure; and there was considerable discussion as to whether or not the Snellen Chart method was adequate, and as to whether or not the ortho-raters were as satisfactory as other instruments. The School Board at this meeting felt that it wanted to be able to refer a larger number of children and recommended that the professional committee come up with a recommendation which would be satisfactory to a majority. After a few meetings, it was concluded that a Massachusetts vision test of some type would be satisfactory to all concerned.

Miss K. D. Carey, the head nurse for the Tri-County Public Health Department, felt that she could devise an instrument which could be built by the mechanics within the school system and be compact and inexpensive enough that the system could afford one for each nurse, and finally one for each of the schools after the next proving period.

This instrument was finally accepted as the approved instrument on March 19, 1957. In the interim, standards acceptable to all members of the committee were arrived at and they were as follows: The grades to be screened were Kindergarten, First, Third, Fifth, Seventh, Ninth, and Eleventh.

The standards were to be: for Kindergarten through Second, an acuity test, right and left done on the scrambled E chart. If this was passed on the 20/30 line, the child was given a pair of +2.00 D. sph. and if he could see the 20/20 line he was referred, and if not, was then given a phoria test, the limits of which were 5Δ exophoria and 4Δ esophoria, and, if within these tolerances, the child was next given a vertical phoria test, the tolerances of which were 2Δ in either direction; the entire test being done at twenty feet up to this point. A design

permitted a rapid recognition of the deviation, and the child was given a red wand which simulated the red streak produced by a Maddox rod contained in a combination occluder. When the infinity test had been completed, the child was then given a near point phoria test, both horizontal and vertical, and the tolerances were set out in the design of an airplane. In the grades above the Third, the same procedure was used, except that the standard for visual acuity was raised to 20/20. At the High School level, additional tests were added to screen for color-blindness, the thought being that at this level the knowledge of color-blindness was essential to aid in vocational guidance. Since this was a pilot plan, if it was found that the seven available nurses and equipment would not permit adequate coverage for the twelve thousand students in the time allotted, the next year would consist of a Snellen test, teacher referral and a color test at the High School level (grades Nine and Eleven). Each child classed as a referral by the parent-teacher team was then re-screened by the nurse before the referral slip was sent to the home.

When the apparatus had been designed and approved by the committee, one hundred children were then screened and the number of referrals calculated. Fifty of these children were then examined by medical refractionists under cycloplegics and 50 were examined by optometrists using non-cycloplegic techniques. A very good correlation was obtained. The total of referrals was 23 per cent. Since the office procedure substantiated the referrals by the instrument, and it seemed as though the new suggested screening techniques were not under referring, there remained then only the problem of setting up the procedure in the schools and the records.

It was then decided to send letters to all of the optometrists and medical refractionists in the Denver area, asking their cooperation in returning the referral slips, explaining the urgency and their value for statitiscal compilation and subsequent case records in the schools.

The method of giving the screening was then discussed and it was decided that screening test would be made by P. T. A. health chairmen and mothers, a team of three or more where possible, assisted by the teacher and supervised by one of the Tri-County health nurses who would then conduct hearing tests simultaneously, and thus merely supervising the screening. The committee decided it should indoctrinate all of the women who were to do the screening. A training session would consist of a two to three hour period which would consist of talks by two professional men, allowing a question period after each talk. The medical refractionist took the first hour and the optometrist

internship. In addition to screening he could do fundus studies on those students where this seemed necessary. It was felt that he also could instruct the actual working teams of parents; aid in the compilation of statistical data, and assist the nurses and school authorities in other ways.

The first meeting of a professional group was set for October 22, 1956, and in attendance at this meeting there were to be three optometrists, an ophthalmologist, a representative from the Clear Creek Medical Society, the head of the Tri-County Health Department, and the head nurse from that department, since the program was to be administered to a large extent by the nurses of that department. The Jefferson County health chairman was also to attend. In actual attendance there were two or three others.

There was immediate opposition to the program, principally by lay members, on the basis of it being an unnecessary expenditure; and there was considerable discussion as to whether or not the Snellen Chart method was adequate, and as to whether or not the ortho-raters were as satisfactory as other instruments. The School Board at this meeting felt that it wanted to be able to refer a larger number of children and recommended that the professional committee come up with a recommendation which would be satisfactory to a majority. After a few meetings, it was concluded that a Massachusetts vision test of some type would be satisfactory to all concerned.

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took the second hour, allowing a half hour question and answer period. Then the teams were given actual indoctrination in the mechanics of screening with the instrument itself, since the theory and history had been discussed in the earlier session. It was decided that since a large number were going to attend, there would be two repetitions of this procedure on succeeding days. A total of approximately one hundred eighty mothers were given this course and it was received with enthusiasm.

At the present time the screening of an estimated 12,000 of 24,300 children in this district is under way. Since a certain number of these children have already received ocular attention, it is estimated that referals will lie somewhere between 18% and 23%.*

The author recommends this approach to school screening for the following reasons:

A greater number of children now being under referred will be referred, and we feel that there will be no large number of over referrals.

It has promoted better interprofessional relations within the county.

It has enlightened a large number of parents in the needs for school visual screening.

It has done a reasonably good public relations job for the following groups: R-1 School District, Tri-County Health Department, and the optometric and ophthalmological professions.

OTTO J. BEBBER, O.D.

428 E. COLFAX
DENVER, COLORADO

*Upon request, the author of this report will send readers a copy of the school referral slip used in this screening program.

ANNOUNCEMENT

A SHORT COURSE ON LIGHT AND VISION AT MICHIGAN

The University of Michigan and the Illuminating Engineering Society are offering a short course on Light and Vision developed by the University of Michigan's Institute of Industrial Health, School of Public Health and Vision Research Laboratories. The courses will be held on the campus at Ann Arbor, March 19, 20, and 21. Optometrists wishing to attend should write the School of Public Health, 109 S. Observatory St., Ann Arbor, Michigan, for reservations and program.

SPECIAL REPORT

ASPECTS OF INTERPROFESSIONAL RELATIONSHIPS*

Carel C. Koch†
Minneapolis, Minnesota

PREFACE

This report has been written to express my own personal opinions as to the manner in which we may solve questions which are now adversely affecting interprofessional relations. I am well aware that certain suggestions which follow will surprise optometrists and that some will disagree. This is to be expected. It is important that we now consider the following aspects of interprofessional relationships so that steps may be taken to remove these areas of disagreement, if not in the manner suggested by the writer, perhaps in other ways. In any event, problems are presented which must be solved in the public's best interest.

ATTITUDE OF OPTOMETRY TOWARDS MEDICINE

The attitude of healing arts practitioners within a professional group towards practitioners in another group is naturally one of many factors influencing the relations which exist between the groups. At times this phase is neglected in considering interprofessional relations and often it is ignored. In considering these relations one may well start by attempting to determine what is the attitude of optometry towards medicine. This is an interesting question and one when officially discussed and reviewed is frequently modified by a long list of qualifications and reservations that make the answer more or less obscure, if it is really answered at all.

As we study the attitude of optometry towards medicine, we are not speaking of the official positions or viewpoints of officers of optometric organizations, as these individuals change from year to year and their attitude may be affected to some degree by their prior legislative experiences, public relations, economic and sociological connections. Nor are we attempting to secure the answer by studying and reviewing the official pronouncements of optometric organizations as shown in

*Read before the annual meeting of the American Academy of Optometry, Section on Pathology, Chicago, Illinois, December 8, 1957. Also read before the Illinois Chapter, American Academy of Optometry, Chicago, Illinois. For publication in the February, 1958, issue of the AMERICAN JOURNAL OF OPTOMETRY AND ARCHIVES OF AMERICAN ACADEMY OF OPTOMETRY.

†Optometrist, Fellow, American Academy of Optometry.

approved resolutions of various bodies. These resolutions may not be truly representative due to the casual manner in which most of these are drafted and approved by small numbers of delegates who do not completely represent the thinking of the large body of optometric practitioners in optometry. In addition, we see in many such resolutions, the handwork of small pressure groups who have some ulterior motive at the time of presentation.

Where then can one go to get a more realistic picture of the attitude of optometry towards medicine? The answer is to turn to the great mass of optometric practitioners themselves whose viewpoints are best determined, not by questionnaires, or by having them vote on specific issues, but by simply observing their day to day actions and opinions in their relations with their patients, the public and other professional men.

In the writer's opinion, there is no better listening-post for such a task than an editor's numerous contacts with his readers. It is from these contacts, both in and out of the Academy, that the resulting observations are drawn. In a large measure, the following seem, to the writer, to reflect the thinking of optometrists both during the period when the National Interprofessional Committee on Eye Care was active,[1] as well as in the later period when some friction has developed between optometry and ophthalmology. Strangely and happily the attitude of optometrists has changed but little during this entire period.

What is this attitude? Optometrists generally think of medicine in terms of the medical men and women they know individually. They generally look upon medicine with respect and hold the art and science of medicine in very high regard. They are sometimes puzzled and confused by certain acts of the medical politician but, on the other hand, no more so than they are also confused by the acts of the optometric politician. All politicians are looked upon as a more or less inevitable and necessary nuisance in a busy clinical world. This probably explains to some degree why the number of optometrists who attend annual meetings of the American Optometric Association is so small in relation to the large number of A.O.A. members. The American Medical Association is also plagued with the same problem to some extent. Of course, the more recent attacks upon optometry by the Guild Prescription Opticians of America[2] and the National Medical Founda-

[1]During the years 1950 to 1953, the committee met at least two times each year. The writer served as one of the representatives of optometry, and also as secretary of the committee.

[2]Carel C. Koch. Diversionary Attack upon Optometry. Am. J. Optom. & Arch. Am. Acad. Optom. 34.5.276-279, 1957.

tion for Eye Care have had an irritating effect, but optometrists point out that they have been under fire before and that these attacks are but a poorly disguised effort to secure more patients for ophthalmologists and opticians at the expense of optometry. Done as crudely as they are, they are likely to backfire. In a later portion of this report these attacks will be reviewed in more detail. The point here is that to the present moment these attacks upon optometry have not changed the opinion of medicine held in the minds of optometrists.

Optometrists generally feel that medicine has made far-reaching and impressive progress in both education and the science of diagnosis and therapeutics. They feel, too, that optometry must match this progress, and most feel that it has. There is a growing awareness among optometrists of the important place our centers of undergraduate training have in maintaining the scientific advancement of optometry, as well as in the education of the optometrists of tomorrow. This awakening is widespread and is growing, and it is important to the future of our colleges and schools.

Optometrists, in very large part, feel the same towards ophthalmologists as they do towards physicians. They seem to have great respect particularly for the better trained men who are for the most part doing the better work. The eye, ear, nose and throat men with but limited specialists training are not as well regarded by optometrists as a rule, but all are held in respect. Optometrists hope that medical and surgical techniques continue to improve so that patients with ocular pathology referred by them to ophthalmologists will receive better and better care in the future.

Most optometrists realize that eye surgeons have to refract, as they are aware of the small number of surgical eye cases that are available to these men. When they hear of an occasional medical specialist refracting 25 to 30 patients in an afternoon, or having lay personnel perform this important function, they resent this just as they object to similar mass refractive procedures on the part of commercial optometrists. Fortunately this is not common.

In general, medicine and ophthalmology have the respect of optometrists. There is very little evidence which shows any desire on the part of optometrists to enter the field of ocular therapeutics.* Some feel, however, that if cycloplegics, mydriatics and surface local anes-

*On occasion such views are presented. Corriveau proposes that optometry become a subdivision of medicine similar to dentistry and that optometrists, after advanced training, practice limited medicine and minor surgical techniques. Long Term Planning in Optometry Inter-Professional Relations. Arthur L. Corriveau, O.D. New England Journal of Optometry. November, 1957, issue, pages 163-168.

thestics were available and used occasionally by optometrists as they are in England, that they might be subject to less occasional criticism by some medical men.[3] But this, too, seems to be the thinking of only a small but growing minority.

The substantial majority of optometrists feel that there is a great future in optometry as it is practiced today. There is a widespread demand for a free and independent profession of optometry, working in close harmony with all allied health workers.

LEGISLATION AND THE DISPENSING OPTICIAN

Interprofessional relationships are affected in no little degree by the desire of dispensing opticians for licensing legislation and by the negative attitude of organized optometry towards the passage of such legislation. While it is true, perhaps, that not all dispensing opticians favor this form of State legislation, it appears that a majority do. This is true for a number of reasons.

First, such legislation gives the dispensing optician a feeling of "standing" in the world of ophthalmic optics, and, he hopes, with the public. As most individuals in the healing arts field are licensed, the dispensing optician feels that he should be. He particularly compares his work with that of the pharmacist who is also a dispenser, and who is licensed.

Next, the dispensing optician feels that licensure is essential from a security standpoint. When licensed to dispense ophthalmic prescriptions by the State, such official recognition removes the fear that under some broad interpretation of an existing optometry law, he might be prohibited from dispensing. As this possibility has also been mentioned in organized optometry and, in fact, may have been tried on one or two occasions in the courts, it appears that the optician's fears are not entirely unfounded. As security is an important motivating force, these facts play a strong part in his insistance for legislation, and thus in inter-professional relations discussions and actions that have an important bearing upon these relations.

The third reason advanced for legislation by dispensing opticians is that such laws inevitably set up some standards of behavior which must be fulfilled by those who are licensed. To be sure the standards at first would not be high, but if a start is made an improvement may follow. Many dispensing opticians feel that this is a very important reason for securing legislation.

[3]Carel C. Koch. Cycloplegics and Mydriatics—What Position Should Optometry Take, If Asked to Use Them. Am. J. Optom. & Arch. Am. Acad. Optom. 30.7, 382-385, 1953.

Closely allied with the need for standards is the need for requiring a minimum educational background for those entering the field of dispensing opticianry. Without legislation on this subject, educational requirements may not be enforced, and this fact holds the level of performance below that necessary to meet either public requirements or those of the professions served by dispensing opticians. This is one of today's problems and the whole question of education for dispensing opticians will be mentioned again in the next portion of this report.

The next factor which has had repercussions in the field of interprofessional relations has to do with the controversy that now exists with optometry as some dispensing opticians engage in contact lens fitting. This problem has probably gone beyond the point of being resolved around the conference table, and has been in the courts. Nevertheless, dispensing opticians insist that the matter be settled by legislation.

The last point raised by dispensing opticians in favor of legislation is that they now have such registration in 18 or 19 States and if they have it in these, they should have the same advantageous legislation in other States as well. All of the factors just reviewed have an important bearing on interprofessional relations. The dispensing optician has a voice in these discussions, and whether we like it or not, he is supported in many of his demands by elements of ophthalmology.

As indicated earlier, there are two sides to this matter. Up to the present optometry has looked with disfavor on the proposals for licensing opticians. The reasons for this attitude are familiar to optometrists,[4] being (1) the frequent and unprincipled attacks upon optometry by many dispensing opticians in their advertising and promotional material. (2) Their persistence in engaging in contact lense fitting without having the fundamental background and specialized training this work requires. (3) Their unethical and widespread steering and capping activities for selected ophthalmologists who should know better than to permit this, and (4) the fee splitting and rebating which was widely practiced until it was declared illegal by the federal courts. Optometrists point out that this practice is still going on between some dispensing opticians and ophthalmologists, if not in its original form, through thinly concealed subterfuges such as gifts of equipment, rental of space on a percentage basis, forgiven loans of capital and other methods. On September 26, 1957, the Canadian income tax appeal board ruled that

[4]Carel C. Koch. Problems with Dispensing Opticians. Part I. Improper Promotional Activities. Am. J. Optom. & Arch. Am. Acad. Optom. 30.6.318-325. 1953.

22 British Columbia ophthalmologists received $360,000 in rebates on prescriptions over a 10-year period and must pay income taxes on that amount.

These are factors which make good interprofessional relations difficult. Yet, in the interest of the public, it is essential that the differences which exist between optometry and dispensing opticianry be resolved. This must come about either by conferences or by legislation. Such conferences have failed in the past, and perhaps will fail again, but with proper spirit and leadership on both sides much could be accomplished. If not, then it seems necessary, to the writer, to clear the air through the enactment of legislation setting up standards of performance for dispensing opticians, thus policing them into some form of ethical behavior.[5]

TECHNICAL EDUCATION FOR OPTICIANRY

In discussing legislation for dispensing opticians, mention was made of the lack of educational opportunities in the entire field of opticianry and the effect of this on interprofessional relations. The American Board of Opticianry recognizes only two schools now teaching mechanical ophthalmic optics for opticians. One of these is in Los Angeles and the other in Buffalo, New York. Both are good schools, but a number of additional training centers are badly needed.

The presently approved schools each have a two year college course for high school graduates. These courses cover the entire field of mechanical optics including dispensing, and the students are given a form of training that enables them not only to do a good job as opticians but to understand what they are doing and why it is done.

Unfortunately, the enrollment at both schools is not large and today most indivduals coming into opticianry do so as apprentices without any formal training in the basic and applied sciences. To be sure this is the way it has been for centuries, but with the rapid development of modern scientific technical methods, this old apprentice system is not giving the young laboratory apprentice the knowledge he must have if he is to serve properly those who prescribe spectacles. More two year college courses for high school graduates who wish to become opticians are needed.

If the standards for dispensing opticianry are to be raised, certainly the standards of opticianry itself must be raised as dispensing is only a small part of the whole field of mechanical ophthalmic optics that constitutes opticianry. It follows, then, as raising standards in dispensing

[5]Glenn A. Fry. Interprofessional Relations in the Design of Eyewear. Am. J. Optom. & Arch. Am. Acad. Optom. 34.4.212-220. 1957.

opticianry is essential for better interprofessional relations, that optometry consider what it can do to help. Optometrists have a tremendous interest in this entire matter even though most of them have given it little or no thought. As they control the facilities which might be used to improve this situation, they should consider using these facilities to accomplish this end.

Optometric schools and colleges should now study the advisability of adding a two year technical course in opticianry to be offered to high school graduates. To a large degree the physical plants are available, with some possible additions necessary in the mechanical optics laboratories. In most places no great number of additional faculty people would be required. Such courses could be offered in a number of places as early as the fall of 1959.

Additional courses of this character, in a manner similar to the courses presented in undergraduate optometry would, over the years, bring into opticianry at all levels—manufacturing, laboratory work and dispensing—a new group of opticians who would have pride in their work and would do much to raise the standards of dispensing opticianry, thus helping interprofessional relations. Also, such a move would place many well trained opticians in optical laboratories where they would better serve optometrists.

GLAUCOMA AND INTERPROFESSIONAL RELATIONSHIPS

It may seem strange that a single disease of the eye, glaucoma, could be tied in with interprofessional relationships between optometry and ophthalmology, but such is the case. At present we are in the midst of a number of well intentioned nation wide promotional campaigns to focus attention on what have become today's popular and well known diseases. It is impossible to escape from this flood of propaganda if one is exposed to any of the mass media. Cancer, tuberculosis, polio, heart problems and more recently asian flu, to mention but a few, are discussed at considerable length on the air and in print. An effort is now being made to add glaucoma to this list of dramatic diseases.

How is this brought about? In the first place, the public is health conscious. The material on these diseases is presented in an interesting way and powerful public relations programs keep interest alive. In other words, organized forces are at work to raise additional sums of money for more public relations activities and, at times, for research. An important secondary reason is to increase the traffic of individuals into physicians' offices. Medical societies naturally approve of this subtle and indirect form of medical advertising as it produces business, and the cost is largely carried by the public either through personal contribu-

tions of funds or through the increased cost of pharmaceuticals, as many drug manufacturers contribute substantially to these activities. Physicians as individuals contribute very little of the total funds used for these purposes, although they frequently serve as technical advisors in laying out medical portions of these campaigns.

The growing campaign relating to glaucoma detection is of interest to optometrists as the manner in which it is conducted frequently at local levels, upsets otherwise normal interprofessional relations. This is very regretable, for when such a situation arises in a locality the close relationships between local optometrists and ophthalmologists are strained, and normal referral procedures are impaired to the ultimate disadvantage of patients with suspected glaucoma.

On the national level, the glaucoma campaign is to a great degree sponsored by the National Society for the Prevention of Blindness. Their work is well done. It represents a sincere effort on the part of Dr. Franklin M. Foote and his staff in attacking one of the causes of blindness and their planning and promotional material has generally been free from anti-optometric propaganda, athough quite naturally and properly, persons with glaucoma are referred to ophthalmologists, as they should be. The N.S.P.B. has, the writer believes, attempted to keep its promotional material free from such bias as might stir up controversy between optometry and ophthalmology. In fact, N.S.P.B. looks to optometry for help and cooperation in making the national program a success. This is particularly true as optometrists are expected to do a good job of screening and always keep glaucoma in mind in working with patients who have reached the presbyopic age.

If only N.S.P.B. were involved in this matter, there would be little or no problem as far as interprofessional relationships are concerned. The problem occurs when their plans and campaign materials filter down to the State level and are sometimes given an anti-optometric twist at that point. Then trouble occurs.

The solution to this State problem of interprofessional relationships lies in optometry's getting into this activity at once in a large way. Every State Optometric Association, assisted by local chapters of the Academy, should develop a "glaucoma-project" and promote it to the fullest degree. As optometrists we have a sincere professional interest in these patients. We are responsible, at least morally,[6] that every precaution be taken by ourselves in screening patients with possible indications of glaucoma and getting these into the hands of an ophthal-

[6]Glenn A. Fry. The Division of Labor Between Optometry & Ophthalmology. Am. J. Optom. & Arch. Am. Acad. Optom. 34.3.150-156. 1957.

mologist. There can be no short cuts or omissions.

Such projects are under way in California, Minnesota, New Jersey, Ohio and Pennsylvania, and perhaps other States as well. This activity should become nation wide. This is a twofold project, requiring (1) post-graduate education and proper instrumentation for optometrists and (2) widespread optometric publicity tying-in with local interest in the subject and thus adding to this interest.

Specifically, several things should be done in each State. First, a local post-graduate course of the refresher type should be arranged in which the newer screening techniques and provocative tests for glaucoma may be reviewed for all optometrists. Second, surveys should be made (by our State Boards of Examiners if necessary), to make sure that every optometrist has at least a tangent screen or campimeter, or other instrument built on the Harrington-Flocks principle, and that he regularly takes central fields on all patients over the age of 40. Third, efforts should be made to increase the use of other screening tests such as the scleral tonometer. A definite effort should be made along this line. Next, the public relations efforts of the State Association should be directed towards pointing up the fact that optometrists are alert and doing something about the problem of glaucoma. This optometric activity—done honestly and sincerely—will tie-in with the local programs of the N.S.P.B. and both the public and optometry will benefit. In addition, the local cause of friction will be reduced or removed.

IS OPTOMETRY A DRUGLESS FORM OF HEALING?

The small group of ophthalmologists who militantly oppose optometry and who are trying to influence the thinking of other physicians in an anti-optometric direction are pointing out that optometry is a drugless form of practice. The implications here are that optometry is in some way comparable to naturopathy or chiropractic. Of course nothing could be further from the truth. This action is taken in the hope that by confusing physicians, we will be placed in the same anti-medical group with drugless healers who are generally unpopular among medical men. If this could be done the result would be that physicians would also dislike optometrists.

This is an unscrupulous, though clever, scheme on the part of these opponents and is one which must be corrected. To be sure, it will not always be easy to do this, but it must be done as the basic tenet is untrue, and it may deceive physicians who have given the matter little thought. In addition, such tactics obviously interrupt normal interprofessional relations.

While it is true we do not regard the use of cycloplegics in refractive work as essential, we take this position because we feel that for the vast majority of patients a better job can be done without the drug than with it. This is no recent belief, but dates back to before 1890 when the first collective scientific optometric thinking began. It was because of this belief that many of our State licensing laws were adopted calling for optometrists to refract without the use of a cycloplegic. Optometrists believed this then and still stand firm on this long tested premise. Since that time our schools and colleges have placed many thousands of optometrists in practice and the success of their work indicates the strength of our position. In addition, research work has verified the contention that the end results of non-cycloplegic and cycloplegic refractions done on the same patients, each by experts in their own technique, produce comparable results.

Moreover, as Kennedy[7] has said, optometry is pro-medical. We have always been friendly towards medicine. The subjects we take in our undergraduate professional schools indicate this, and our entire training as optometrists supports this. Besides, we refer many patients to medicine. As pointed out in the first part of this report the attitude of optometrists towards medicine is excellent, and optometrists have never considered themselves anti-medical by any stretch of the imagination. Furthermore, ophthalmologists refract under the same conditions as optometrists, using similar instruments and techniques. The overall procedures of both are the same. The great majority of refractions that are done today are completed without using a drug.

To offset the anti-optometric propaganda, all of the facts about optometry must be presented to leading physicians in every State. The data must be concise, but they must fully cover these points: the fundamentals of optometric undergraduate professional education: the fact that optometrists make a complete examination of the eye and orbit before each refraction: that they are trained and skillful in doing this without the use of a cycloplegic or mydriatic: that their success in this work is widespread: that optometry is, and has always been, pro-medical: that at present there is a shortage of optometry students and a good opportunity for them later on in practice and that we invite them as physicians to refer prospective students to us for enrollment in our schools and colleges. These are facts that must be brought before medical men again and again. Optometry has nothing to hide. Its training and work are the best the field affords. We are proud of optometry, and it can and must be sold to medicine.

[7]John R. Kennedy, O.D. St. Paul, Minn. Personal communication, Sept. 18, 1957.

This is a joint task for the American Optometric Association and each State Optometric Association. The A.O.A. has the facilities to get the promotional material written and printed. It should (with its recent dues increase) stand a major part of the cost of this material. Each State Optometric Association could assume the cost of distribution as well as part of the costs of this special promotional material. This is an activity which takes precedent over many other day-to-day organizational activities, and programs should be changed to permit this important work to go forward at once. A nation wide program of this sort directed to physicians will offset such anti-optometric derogatory material as has been used, and will pay dividends in improving the interprofessional relationships between optometry and medicine.[8]

THE NEW PUBLIC RELATIONS FRONT FOR OPHTHALMOLOGY

At this time a report on interprofessional relations would not be complete without some comment on the National Medical Foundation for Eye Care. To be sure, in an earlier portion of this paper, this new ophthalmological organization was mentioned. However, the purposes of this splinter group should be examined more closely, since without question they intend to adversely affect the interprofessional relations between optometry and ophthalmology as much as they can. It is a very unfortunate thing that this is the case, as everyone, including the public, suffers from this type of action. At this point, in all fairness, two things should be pointed out: (1) many ophthalmologists have not joined this group, and (2) in optometry we also have a small fringe group who can see nothing good in anything ophthalmology is doing and they, too, are at times quite vocal about it. In fact some of the sadest experiences the writer can remember in the field of interprofessional relations work have been brought about by recalcitrant optometrists.

The National Medical Foundation for Eye Care has for its major purpose the vigorous promotion of ophthalmology. This is basically a public relations organization and we, in optometry, have no objection, nor do we have the right to object if this organization puts ophthalmologists and their work before the public in the best possible manner, providing they leave optometry out of their discussion. This is the purpose of a well run public relations program, and despite its high sounding name this organization is fundamentally a public relations front for ophthalmology, financed in a very considerable part by ophthalmologists

[8]Carel C. Koch. Education in Interprofessional Relations. Am. J. Optom. & Arch. Am. Acad. Optom. 28.6.283-289. 1951.

contributions; although in the October, 1957, issue of the DISPENSING OPTICIAN an editorial appeared inviting dispensing opticians to join as affiliate members.

Recently this group has published a booklet[9] that outlines its criticism of optometric practice and reviews the reasons for the reluctance of ophthalmologists to work in harmony with optometrists. In this booklet our shortcomings are emphasized and physicians in general practice are also made to believe that optometry is about to invade the field of ophthalmology through the treatment of eye disease. Actually organized optometry has taken no steps in this direction nor do our undergraduate professional schools and colleges teach these subjects. The material in this booklet is largely a rehash of the things we have heard many times before, and as usual most of the inferences are either entirely or partially untrue or twisted. However, a repetition of these statements has some adverse affect upon interprofessional relations.

There is a fifth column of hatred here, and it will in the end be crushed when those ophthalmologists who are interested in the public's good, again become active and exercise their control. What this splinter group overlooks is that optometry is here to stay, and good relations between medicine and optometry are in the public interest.

THE DISPENSING OPTICIAN AS A STEERER AND CAPPER

Interprofessional relations are affected in no small degree by the smugness of certain ophthalmologists in referring to their high ethical concepts of practice while at the same time, condoning and participating in the very worst form of unethical practice procedure—that of having steerers and cappers soliciting patients for them.

In the larger urban centers throughout the United States, this is a common practice. Certain dispensing opticians in most of these cities advertise spectacles and optical services and in their paid publicity make little or no effort to disclose the fact that only optical dispensing is done in their shops. This is not true of all dispensing opticians, but only of some. Prospective patients needing refractive care are attracted by this promotion and are smoothly taken by the dispensing optician to a nearby ophthalmologist's office where a refraction is immediately made, and the patient is returned to the dispensing optician's shop where the sale of materials takes place. In some instances the patient is actually escorted from shop to office and back again so there can be no slip-up or possibility that the patient might escape.

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[9]Medicine, Optometry and the Public Welfare. A Report to the Medical Profession. (Anonymously written.) Published by the National Medical Foundation for Eye Care, 250 West 57th St., New York City. 49 pages, paper covers. 1957.

Certain types of dispensing opticians see nothing wrong in this and have actually made similar arrangements to do the same sort of steering and capping for nearby optometrists. When these arrangements are found to exist, the State Board of Examiners in Optometry takes prompt action against the optometrist in correcting the situation, but the Medical Boards seem entirely indifferent to the matter. That these situations are not just chance referrals[10] is clear when ophthalmologists have been known to invest their funds in optical dispensing establishments, and long lists of them are known to have received substantial kick-backs from dispensing opticians in the past.

While the writer is well aware that among certain optometrists many unethical practices exist, we believe that fee-splitting, receiving kick-backs from dispensing opticians and the use of steering and capping are not high on the list of these unethical practices. Yet, unfortunately, a substantial number of ophthalmologists engage in these practices while remaining members in good standing of medical societies that are known to have high standards of practice requirements for membership.

Of course not all ophthalmologists nor dispensing opticians engage in these improper activities. Many are entirely ethical and do nothing that could upset interprofessional relations. More and more ophthalmologists are doing their own dispensing, thus freeing themselves from any possible criticism, yet the practices mentioned are sufficiently widespread in most urban centers to upset interprofessional relations. In addition, in some areas these practices seem to be growing in extent and unless some corrective steps are taken to eliminate the problem by officials in ophthalmology working with medical authorities, a repetition of the 1948 scandal (the dispensing optician-ophthalmologist kick-back court action) will occur. Perhaps it is already past due.

From an optometric standpoint, the question is frequently raised as what we can do about this, or what we should do. The situation is bad because when any individuals in the eye-care field get in trouble, the result is that the innocent suffer along with the guilty. This was true in 1948 when the public lost faith in everyone having anything to do with refractive care and spectacles because of the revelations of the Federal Court on the improper kick-back.

It has been seriously proposed that optometrists raise the necessary capital and establish dispensing opticians shops in various cities under

[10]Carel C. Koch. Problems with Dispensing Opticians. Part II. The Referral Question. Am. J. Optom. & Arch. Am. Acad. Optom. 30.8.438-443. 1953.

their own control and supervision. In other words fight fire with fire. If this were done, it would require a marked change of attitude towards steering and capping on the part of our State Boards of Examiners in Optometry, and it is doubtful if such a change in thinking would occur. In addition it would be a mistake. The old saying that two wrongs do not make a right applies here. For optometry to adopt the bad practice habits of some ophthalmologists would not be the form of progress we hope for in optometry. Nor, would it improve interprofessional relations.

The solution to this vexing problem rests in several possible actions. The first of these is a clear cut insistance for proper and normal behavior on the part of all ophthalmologists by the State Board of Medical Examiners. The attorneys for both Boards should be of help here. The next is licensure of dispensing opticians and setting practice standards for them to follow. If these fail, perhaps what is needed is a nation wide investigation covering all aspects of visual care with particular stress on the distribution of ophthalmic materials at the patient level. In 1929 crime problems in the U.S.A. became so bad that President Herbert Hoover named a national commission headed by George W. Wickersham to study the situation. This group considered conditions at a national level and were successful in centering greater attention on law enforcement. If all elements of the healing arts concerned with vision cannot mend their ways and clean house, it may be necessary to go to the government for a commission to focus attention and remedial legislation on these matters.

IS THERE AN OVEREMPHASIS ON EYE PATHOLOGY?

An earlier section of this report dealt with glaucoma and the suggestions which were made to reduce causes of professional friction resulting from campaigns to promote glaucoma screening. This section deals with the subject of eye pathology in general, and the occasional overemphasis of this subject which, at times, causes problems in interprofessional relations between optometry and ophthalmology.

While no one knows exactly how much ocular pathology is present in the United States, it is generally admitted that the total amount is small in relation to the population. Statistics on this subject are inaccurate as these largely come from eye hospitals, or public eye clinics, where naturally a substantial number of patients have some sort of either active or non-active eye pathology.

Patients in America, in addition to being health conscious, have also developed to a somewhat marked degree the ability, as Fry has pointed out, of screening their problems and selecting their specialists in

accordance with their needs. This is particularly true in the eye care field. Many patients with a symptomatic pathological eye condition will go directly to an ophthalmologist. Patients who seek the services of an optometrist, tend to be those without obvious pathological symptoms.

The statistics developed by each group on the subject of eye pathology are subject to question as the sample used is an improper one if the figures are related to the population as a whole. In any event it is probably safe to say that only a very small portion of the public have an undiagnosed systemic or an ocular pathological condition that requires ophthalmological supervision.* Certainly these patients should have this care, and it is up to optometrists to carefully screen all cases seen by them so that this may be accomplished.

In the entire lifetimes of all peoples in this country only a very small percentage of the population ever experience serious ocular pathology. At any given time the number of these serious cases of ocular pathology is probably considerably less than one-half of one per cent of the population, and even then a portion of this pathology is of such nature that nothing specific is usually done about it other than to keep it under observation. In great part we can thank the high standard of living in North America and the enforced hygenic programs for this low rate of ocular pathology. These figures, however, should be kept in mind in making policy decisions in our legislative halls, insurance programs and industrial eye and visual safety work projects.

Interprofessional relations are sometimes strained, however, when undue emphasis is placed by ophthalmologists, on the magnitude of this small group of pathological patients, particularly when no mention is, at the same time, made of the great overall body of patients whose only eye problems fall in the field of refractive errors or motor anomalies.

HANDLING PATIENT REFERRALS

Although many problems of interprofessional relations were discussed at the December 9, 1951, meeting of the National Interprofessional Committee on Eye Care in New York City, the referral of patients consumed the major portion of the session. In this connection Dr. Glenn Moore presented to the committee for its approval a statement of

*Fitch reviews this problem and points out that already there are too many ophthalmologists for the surgical work available to them. Unless surgery is done frequently by an ophthalmologist it is not apt to be done well. The spreading of small numbers of surgical cases over a large number of ophthalmologists will result in lessened efficiency of all. Observation on Optometry's and Ophthalmology's Interprofessional Relations. Lawrence Fitch, O.D. Editorial, January, 1958, issue. Am. J. Optom. & Arch. Am. Acad. Optom.

the official policy of the American Optometric Association relative to the interprofessional referral of patients. This was approved in the following form: "Referral of patients to ophthalmologists by optometrists and vice versa should be on a consultation basis with full reciprocal professional courtesies and privileges. Optometry appreciates that it may be necessary for the ophthalmologist, to conduct a refraction or other investigation of the visual status in the diagnosis or treatment of ocular or other pathology. In case of the referral of a patient to an ophthalmologist by an optometrist, the former should give the latter a confidential report, which should include any information which may be coordinated in affording the best optometric care to the patient by the optometrist. The ophthalmologist should not furnish a prescription or advice relating to the optometric phase of the patient's condition to the patient."[11]

A general observance of this approved policy statement on the part of both ophthalmologists and optometrists would remove one of the thorny problems which have confronted the professions. It is true that many ophthalmologists, both before and after the adoption of the foregoing statement, have followed this policy and have enjoyed excellent interprofessional relations with optometrists. However, many have failed to do so, and to some degree the problem remains.

This is not entirely the fault of ophthalmologists. In many instances the referring optometrist is to blame as he merely sends the patient to an ophthalmologist with no report or suggestions, and by inference at least, because of his actions, may be suspected to have lost interest in the case.

In the effort to rectify this condition and to improve the mechanics of professional referrals the Practice Management Committee of the American Optometric Association has prepared a referral form to be filled in and mailed to the ophthalmologist which calls for a consultant's reply. These forms, which are available from the A.O.A., are in triplicate. The original and first copy going to the ophthalmologist, the second copy for the files of the optometrist. Both patient and optometrist sign the form. A wide spread use of these referral forms may eliminate this problem in interprofessional relations. Certainly the matter should be given careful consideration by optometrists everywhere.

SUMMATION

These are all matters of major significance as these problems have an adverse affect upon the well being of millions of citizens. Public and

[11]Virginia Huck. National Interprofessional Committee on Eye Care Meets in New York. Am. J. Optom. & Arch. Am. Acad. Optom. 29.1.53-54. 1952.

private health programs are reluctant to include routine visual care services as part of their benefits when they learn that the professional participants are prone to squabble among themselves. It is plain, that we as optometrists have yet to convince some ophthalmologists that optometrists are not planning to invade the field of diagnosing and treating ocular pathology. That optometrists are charged with the responsibility for recognizing such departures from the normal state is an accepted fact both in long time usage and in law. That such patients should be referred to ophthalmologists for care is also taken for granted, as is the fact that it is the moral obligation of optometrists to practice in this way.

This report deals with a few of the many problems affecting the close interprofessional relationships between optometry, ophthalmology and opticianry. To a considerable degree the attitude of optometry has everywhere been emphasized. Suggestions are made in the effort to provide remedies for these problems. The writer is well aware that some of the suggestions run quite counter to the orthodox thinking of the present organized leadership of optometry. However, much of this thinking is based on the now perhaps outmoded official policy of many years standing and it is possible that the times have changed sufficiently to warrant a restudy of many of these matters. Perhaps major changes, not only in our thinking, but in our official policy of the profession, must now be made if interprofessional relationships are to be improved.

As has been said, this report approaches these problems from the standpoint of optometry and thus in some instances only the attitude of optometry has been stressed. There are two sides to most of these matters and in a subsequent report some of these problems will be reviewed from the aspect of ophthalmology and perhaps opticianry. In addition there are other very important problems which have not been mentioned at all. These problems are those in which optometry is largely at fault. These, too, have a very adverse affect upon interprofessional relations. In the second report, which will follow later in the year, these will also be reviewed and suggestions will be made to eliminate these irritants in the effort to improve the overall tone of relationships between optometry, ophthalmology and opticianry.

TRANSACTIONS OF THE AMERICAN ACADEMY OF OPTOMETRY

A department devoted to announcements, reports, appointments, organization data, news, professional problems and ideals, as these relate to the Academy.

NEW YORK ACADEMY OF OPTOMETRY ELECTS OFFICERS

At the annual election of the New York Academy of Optometry, Dr. Bernard Rosett, Forest Hills, was elected president to serve for 1958. The other officers are Dr. Harold Neuwrith, New York City, vice-president; Dr. Turner O. Veith, Tenafly, New Jersey, treasurer and Dr. Herman Sager, Lake Success, secretary. The officers and the following members will serve on the Executive Council: Dr. Samuel Frank, Brooklyn; Dr. Richard McChesney, Freeport; Dr. Harris Ripps, Rego Park, and Dr. Harold Solan, New York City.

COMMITTEES AND ROSTER OF ACADEMY MEMBERS

Dr. R. W. Tubesing, president, American Academy of Optometry, has announced the appointment of the following Committees:

PAPERS AND PROGRAM COMMITTEE: Dr. Ralph E. Wick, Rapid City, South Dakota, chairman; Dr. Donald Springer, Anniston, Alabama; Dr. John Zettel, Cincinnati; Dr. G. W. Clay, Ardmore, Oklahoma, and Dr. Leo Madigan, Boston.

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In this issue, pages 102-116, are also presented the Geographical Roster of Academy members. This roster is published annually in the February issue. Members and all of our more than 7,000 readers are urged to file this special issue for reference purposes as this geographical roster affords a basis for making qualified referral for those patients moving from one part of the world to another.

RUDOLPH EHRENBERG.

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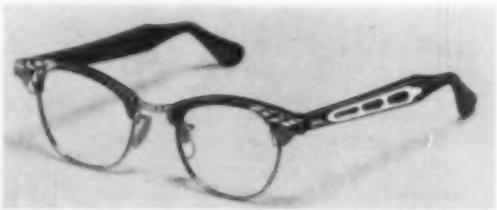
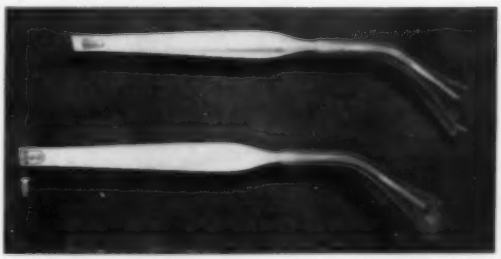


New No. 62 all-Lurium Temple is pictured above on Mansfram. No. 65 Lurium Temple has crystal tips. Front and back views shown at right. Hinge countersunk in side for extra security and good looks. Equipped with new Tempeloc hinge pins as well as screws.



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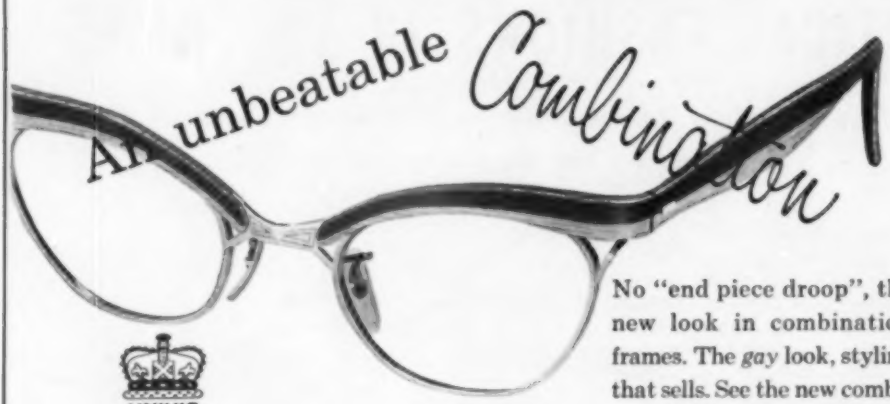

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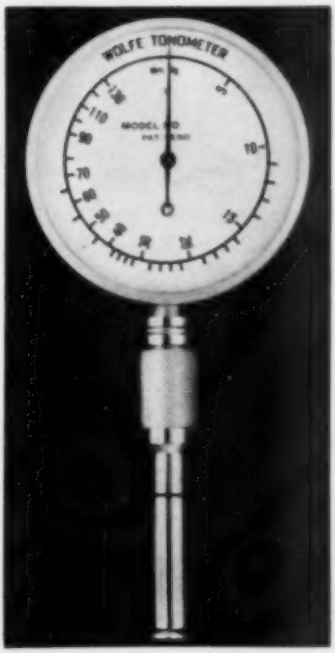

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